WASTEWATER PLANNING ASSUMPTIONS

FOR CORE RESERVATION AND POTLATCH BUBBLE

12/8/06

> Population

- 1. Population will grow at approximately 1-2 % per year according to Mason County state and tribal census; according to tribal administration, the anticipated growth rate will be 2% annually (see spreadsheet with number of households/current population estimates).
- 2. There is a waiting list for housing on the reservation 111 families.
- There has been an increase in younger population with higher household size due to more families with children and extended multi-generational families (assume 4.16 people per household).

➤ Land Use

- 1. 1977 Draft Land Use Plan, but no current comprehensive plan (comprehensive master plan for entire Reservation is in progress—on fast track/simultaneous to the wastewater development plan)
- 2. Moving the Tribal Center to the WSDOT site has been discussed as possible opportunity in 2008+ (tribal government employment at the Tribal Center is anticipated to double in 5 years to about 200). Assume a major building and several small buildings and treatment facility at the site.
- 3. Consider footprint of the MBR facility at the DOT site and potential neighbor impacts
- 4. Treatment plant has "first dibs" on the WSDOT site.
- 5. If above takes place, consider possible alternative uses for the lower reservation (many options are being evaluated).
- 6. Continuing upland residential opportunities primarily in tribal village site (138 homes in new housing development within 15 years—also at new housing site will be community use facilities)
- 7. New residential development will not occur in the floodplain except remodels

- 8. East side of 101 portion of Minerva Beach will remain the same for approx 10 years
- 9. West side of Minerva Beach will be modified by State Parks over 2-3 (3-5?) years according to a yet-to-be developed comprehensive plan

> Commercial and Economic Development

- 1. Substantial economic development will occur primarily at the intersection of Highway 101 and Highway 106. This will be more economic development than commercial services.
- 2. Only 6 +/- acres of the 51 at the intersection of 101 and 106 in service area H are developable.
- 3. Additional economic opportunities are the west side of 101 and perhaps WSDOT site....potential for other sites immediately north of Potlatch currently in fee status
- 4. At least four new businesses are anticipated within 20 years (2 large-scale, 2 moderate-scale)
- 5. The load capacity at the Casino will quadruple within 5 years.

> Service Areas

- 1. Wastewater service will not be planned for the Sunnyside area (service area K) UNLESS a site specific cluster system outside of these planning efforts
- 2. Wastewater service will not be planned for Area I.
- 3. Area G –there is economic development potential on both sides of 101. Want to be able to serve with sewer.
- 4. The east side of 106, south of the intersection will have sewer service in Area J. The area is planned to have a community center, Boys and Girls Club. Assume 50 staff and visitors.
- 5. The Area E service area for the Potlatch Bubble will be planned to go to the north boundary of the Reservation

> Wastewater Treatment Areas, Treatment Sites and Methods, Effluent Disposal

- 1. Assume we will carry 2 options for the planning: two separate facilities for Potlatch and the Core Reservation, and one facility for Potlatch and the Core.
- 2. There are several options for sewage treatment for the Potlatch State Park, Minerva Beach and some of the nearby residential and commercial areas (within maybe a half mile north of the northern State Park boundary.as per the service area above which could include Waterfront at Potlatch, PUD, Womens Clubs, Potlatch Power Plant
- 3. Consider treatment options that produce Class A reclaimed water;
- 4. Evaluate treatment and disposal options in terms of opportunities to use effluent for economic benefit (forest treatments et.al., using dry/intermittent streambed for disposal, creating catch wetland/lake).
- 5. The new treatment facilities are to be low visibility and should meet high air quality standards (new FARR guidelines per EPA)
- 6. The southwest corner of the WSDOT site (14 acres) is the focus of planning for a Treatment Facility. This planning effort will focus on the back part of the DOT site at tow of slope.
- 7. No direct surface marine discharge will be allowed
- 8. Upland discharge (spray irrigation) of treated Wastewater should be studied along with wetland disposal in new and/ or constructed wetlands and infiltration
- 9. First phase of new homes in the new residential housing project (20 homes)will be clustered with an onsite system or use Potlatch Park/Minerva drainfield in newly acquired area with ability at a later date to drain down to the lowland portion of the Potlatch Bubble where the waste from those homes will be treated either at some type of community on-site system or at a sewer treatment facility
- 10. As new housing is built, provide for the ability to easily connect new houses to the sewer system sooner or later
- 11. Some new method of managing wastewater will need to be available as the new homes on the reservation come along by Fall 2008

12. Any future new resort/casino development on the upland area (Simpson / Green Diamond parcels on Rez) would have self-contained wastewater treatment, and should not be included for these planning efforts.

➤ Phasing of Growth and Sewer Service

- 1. Projected residential growth follows housing policy workgroup goals (Growth rate for new residential area includes 138 homes in three phases over 15 years with anticipated overall Reservation annual population growth rates of 2%)
- 2. Opportunities exist for expanded commercial development in service areas 2 and 3 by the Tribe along owned and newly acquired properties INCLUDING Twin Totems, Lucky Dog Casino and Hood Canal School #404. As the Tribe provides water and wastewater support, non –tribal owned entities can be tie into tribal system(s), thru incentives, ordinances, codes (Mason County reciprocal connection.)

Utility and rate structure(s) can be tasked from the planning effort to provide certain financial assumptions in levies, pay-back debt-servicing.

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